

# Notice of Allowability

Application No.

10/699,994

Examiner

Susan W. Berman

Applicant(s)

SCRANTON ET AL.

Art Unit

1711

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to AMENDMENT filed 11-13-06.
2. ☒ The allowed claim(s) is/are 1-22, 24-58 and 68.
3. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
  - a) ☐ All    b) ☐ Some\*    c) ☐ None    of the:
  1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

\* Certified copies not received: \_\_\_\_\_.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.

**THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.**

4. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
  5. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
    - (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
      - 1) ☐ hereto or 2) ☐ to Paper No./Mail Date \_\_\_\_\_.
    - (b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date \_\_\_\_\_.
- Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
6. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

## Attachment(s)

1. ☒ Notice of References Cited (PTO-892)
2. ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3. ☐ Information Disclosure Statements (PTO/SB/08),  
Paper No./Mail Date \_\_\_\_\_
4. ☐ Examiner's Comment Regarding Requirement for Deposit  
of Biological Material
5. ☐ Notice of Informal Patent Application
6. ☐ Interview Summary (PTO-413),  
Paper No./Mail Date \_\_\_\_\_
7. ☒ Examiner's Amendment/Comment
8. ☒ Examiner's Statement of Reasons for Allowance
9. ☐ Other \_\_\_\_\_

***Continued Examination Under 37 CFR 1.114***

A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 11-13-2006 has been entered.

***Election/Restrictions***

Claim 1 is allowable. The restriction requirement with respect to patetnably distinct species, as set forth in the Office action mailed on 04-22-2005, has been reconsidered in view of the allowability of claims to the elected invention pursuant to MPEP § 821.04(a). **The restriction requirement is hereby withdrawn as to any claim that requires all the limitations of an allowable claim.** Claims 7-13, 28-30, 39, 47, 48, 50, 52, 54, 56 and 58, directed to non-elected species, are no longer withdrawn from consideration because the claim(s) requires all the limitations of an allowable claim. However, claims 59-67 and 69, directed to a non-elected method and product thereof, are withdrawn from consideration because the claims do not require all the limitations of an allowable claim.

In view of the above noted withdrawal of the restriction requirement, applicant is advised that if any claim presented in a continuation or divisional application is anticipated by, or includes all the limitations of, a claim that is allowable in the present application, such claim may be subject to provisional statutory and/or nonstatutory double patenting rejections over the claims of the instant application.

Once a restriction requirement is withdrawn, the provisions of 35 U.S.C. 121 are no longer applicable. See *In re Ziegler*, 443 F.2d 1211, 1215, 170 USPQ 129, 131-32 (CCPA 1971). See also MPEP § 804.01.

#### EXAMINER'S AMENDMENT

The application has been amended as follows:

***Cancel claims 59-67 and 69.***

***In each of claims 7-13, 39, 47, 48, 50, 52, 54, 56 and 58:***

***Change the status identifiers from “(withdrawn)” to “(original)”.***

#### REASONS FOR ALLOWANCE

The following is an examiner's statement of reasons for allowance:

Claims 59-67 and 69 are canceled as being drawn to non-elected inventions.

The rejections of record are withdrawn in response to the amendments of claims 1 and 68 and applicant's arguments for reconsideration submitted 11/13/2006.

The prior art previously cited and cited herein below does not disclose or teach a microemulsion process for producing a polymer or product thereof comprising selecting a water-soluble photoinitiator to obtain a polymer having the functional end groups now recited in claims 1 and 68 having been derived from the photoinitiator.

**Capek (I) and Capek (II):** Applicant argues that Capek et al (I) and Capek (II) each fail to teach a process whereby an initiator system produces monomer-soluble radical active centers containing desired end groups. This argument is persuasive because the amended claims now

require that the end groups are selected from the Markush group set forth in claims 1 and 68. It is agreed, as argued by applicant, that Capek (II) does not teach preparation of polymers having functional end groups, such as hydroxyl.

**Kuo et al and Morgan et al:** Applicant argues persuasively that dibenzylketone is not a water-soluble photo-initiator. This argument is persuasive because although Kuo et al disclose "oil-soluble photoinitiator". Applicant further argues persuasively that Morgan et al disclose water-soluble initiators that are thermal initiators.

**Abusleme et al:** Abusleme et al teach using free radical photoinitiators, including water-soluble photoinitiators, and UV-VIS radiation to produce fluorinated copolymer. Abusleme et al further teach that the thermochemical stability of the copolymer depends on the nature of the chain-end groups deriving from the initiator, such as methyl groups from di-tert-butyl peroxide or acetone (column 3, lines 17-30). However, Abusleme et al do not provide motivation to select a photoinitiator to provide functional end groups such as those set forth in amended claims 1 and 68 because no specific photoinitiators having such functional groups are taught and Abusleme et al desire stable end groups rather than functional end groups.

The following references are cited as art of interest: **Lu et al (5,521,229)** disclose a polymer composite prepared from a microemulsion comprising ethylenically unsaturated polar monomer in the aqueous phase, ethylenically unsaturated hydrophobic monomer in the oil phase and a surfactant. Free radical polymerization by irradiation in the presence of a photoinitiator having ionic groups, such as hydroxyl, carboxyl or amino, is disclosed (column 9, lines 1-39, and column 17, lines 35-38). However, Lu et al do not mention selecting a photoinitiator to obtain a polymer having functional end groups derived from the initiator. **Turner et al (4,521,580)**

disclose a microemulsion process for producing acylamide copolymers using water-soluble free radical initiators. Turner et al do not mention photoinitiators or irradiation or providing polymer end groups derived from the initiator. **EP 0 391 343** discloses aqueous polymeric microemulsions made by utilizing a water soluble initiator or a redox initiator system, such as peroxide or persulfate. EP '343 does not mention photoinitiators or irradiation or providing polymer end groups derived from the initiator.

### ***Conclusion***

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Susan W. Berman whose telephone number is 571 272 1067. The examiner can normally be reached on M-F 9:30-6:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, James Seidleck can be reached on 571 272 1078. The fax phone number for the organization where this application or proceeding is assigned is 571 273 8300.

Art Unit: 1711

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

SB  
12/23/06



Susan W Berman  
Primary Examiner  
Art Unit 1711